AMENDMENTS TO THE CLAIMS:

This listing of the claims will replace all prior versions, and listings, of the claims in this application.

Claims 2, 17, 25, 28, 31, 48 and 49 were previously canceled without prejudice or disclaimer. Claims 1, 3-16, 18-24, 26, 27, 29, 30, 32-47 and 50 are canceled herein without prejudice or disclaimer.

Claims 51-98 are newly added.

Listing of Claims:

1-50. (Canceled)

51. (New) A method comprising:

sending a notification from a server to a mobile station, wherein the notification is configured to begin updating of a security-related parameter by the mobile station;

receiving, by the server, a capability message from the mobile station, wherein the capability message is indicative of a messaging technique supported by the mobile station;

sending, based on the capability message, a first request message from the server to the mobile station, wherein the first request message comprises at least one first command defined to cause the mobile station to invoke a process to update the security-related parameter;

receiving, by the server, a first response message from the mobile station, wherein the first response message comprises a status of a computation of a first value performed by the mobile station;

sending a second request message from the server to the mobile station, wherein the second request message comprises a second value and at least one second command defined to cause the mobile station to compute the security-related parameter;

receiving, by the server, a second response message from the mobile station,

wherein the second response message comprises the first value;

        sending a first commit message from the server to the mobile station; and

        receiving, by the server, a first commit response message from the mobile station,

        wherein communications between the server and the mobile station are performed using an internet protocol.

52. (New) The method of claim 51, wherein the security-related parameter comprises an authentication key, a security key or a security key defined by a code-division multiple access standard.

53. (New) The method of claim 51, wherein the internet protocol comprises an internet protocol-based over-the-air device management protocol.

54. (New) The method of claim 51, wherein the server comprises an internet protocol-based over-the-air device management server.

55. (New) The method of claim 51, wherein the first value comprises a MS_RESULT value and wherein the second value comprises a BS_RESULT value.

56. (New) The method of claim 51, wherein the at least one first command comprises a first EXEC command and wherein the at least one second command comprises a second EXEC command.

57. (New) The method of claim 51, wherein the first request message comprises an internet protocol-based over-the-air device management key request message, wherein the first response message comprises an internet protocol-based over-the-air device management key response message, wherein the second request message comprises an internet protocol-based over-the-air device management key gen request message, wherein the second response message comprises an internet protocol-based over-the-air device management key gen response message, wherein

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the commit message comprises an internet protocol-based over-the-air device management commit message, wherein the commit response message comprises an internet protocol-based over-the-air device management commit response message.

58. (New) The method of claim 51, wherein the notification is sent from the server to the mobile station in response to the server receiving a third request message from another server, wherein the first request message encapsulates the third request message, the method further comprising:

sending a third response message from the server to the other server, wherein the third response message comprises the status of the computation of the first value;

receiving, by the server, a fourth request message from the other server, wherein the fourth request message comprises the second value, wherein the second request message is sent from the server to the mobile station in response to the server receiving the fourth request message, wherein the second request message encapsulates the fourth request message;

sending, in response to the server receiving the second response message from the mobile station, a fourth response message from the server to the other server, wherein the fourth response message comprises the first value; _

receiving, by the server, a second commit message from the other server, wherein the first commit message is sent in response to the server receiving the second commit message from the other server; and

sending, in response to the server receiving the first commit response message from the mobile station, a second commit response message from the server to the other server.

59. (New) The method of claim 58, wherein the other server comprises an IS-683 server, wherein the method enables the IS-683 server to invoke the updating of the security-related parameter by the mobile station using internet protocol-based communications.

60. (New) The method of claim 51, further comprising:

in response to the server receiving the first response message from the mobile station, computing, by the server, the second value; and

in response to the server receiving the second response message from the mobile station, computing, by the server, the security-related parameter.

61. (New) An apparatus comprising:

at least one processor; and

at least one memory including machine-readable program instructions, the at least one memory and the machine-readable program instructions being configured to, with the at least one processor, cause the apparatus at least to perform:

sending a notification to a mobile station, wherein the notification is configured to begin updating of a security-related parameter by the mobile station;

receiving a capability message from the mobile station, wherein the capability message is indicative of a messaging technique supported by the mobile station;

sending, based on the capability message, a first request message to the mobile station, wherein the first request message comprises at least one first command defined to cause the mobile station to invoke a process to update the security-related parameter;

receiving a first response message from the mobile station, wherein the first response message comprises a status of a computation of a first value performed by the mobile station;

sending a second request message to the mobile station, wherein the second request message comprises a second value and at least one second command defined to cause the mobile station to compute the security-related parameter;

receiving a second response message from the mobile station, wherein the second response message comprises the first value;

sending a first commit message to the mobile station; and

receiving a first commit response message from the mobile station,

wherein communications between the apparatus and the mobile station are performed using an internet protocol.

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62. (New) The apparatus of claim 61, wherein the security-related parameter comprises an authentication key, a security key or a security key defined by a code-division multiple access standard.

63. (New) The apparatus of claim 61, wherein the internet protocol comprises an internet protocol-based over-the-air device management protocol.

64. (New) The apparatus of claim 61, wherein the apparatus comprises an internet protocol-based over-the-air device management server.

65. (New) The apparatus of claim 61, wherein the first value comprises a MS_RESULT value and wherein the second value comprises a BS_RESULT value.

66. (New) The apparatus of claim 61, wherein the at least one first command comprises a first EXEC command and wherein the at least one second command comprises a second EXEC command.

67. (New) The apparatus of claim 61, wherein the first request message comprises an internet protocol-based over-the-air device management key request message, wherein the first response message comprises an internet protocol-based over-the-air device management key response message, wherein the second request message comprises an internet protocol-based over-the-air device management key gen request message, wherein the second response message comprises an internet protocol-based over-the-air device management key gen response message, wherein the commit message comprises an internet protocol-based over-the-air device management commit message, wherein the commit response message comprises an internet protocol-based over-the-air device management commit response message.

68. (New) The apparatus of claim 61, wherein the notification is sent to the mobile station in response to receiving a third request message from another server, wherein the first request message encapsulates the third request message, the at least one memory and the machine-

readable program instructions being configured to, with the at least one processor, cause the apparatus at least to further perform:

   sending a third response message to the other server, wherein the third response message comprises the status of the computation of the first value;

   receiving a fourth request message from the other server, wherein the fourth request message comprises the second value, wherein the second request message is sent to the mobile station in response to receiving the fourth request message, wherein the second request message encapsulates the fourth request message;

   sending, in response to receiving the second response message from the mobile station, a fourth response message to the other server, wherein the fourth response message comprises the first value;

   receiving a second commit message from the other server, wherein the first commit message is sent in response to receiving the second commit message from the other server; and

   sending, in response to receiving the first commit response message from the mobile station, a second commit response message to the other server.

69. (New) The apparatus of claim 68, wherein the other server comprises an IS-683 server, wherein the apparatus is configured to enable the IS-683 server to invoke the updating of the security-related parameter by the mobile station using internet protocol-based communications.

70. (New) The apparatus of claim 61, the at least one memory and the machine-readable program instructions being configured to, with the at least one processor, cause the apparatus at least to further perform:

   in response to receiving the first response message from the mobile station, computing the second value; and

   in response to receiving the second response message from the mobile station, computing the security-related parameter.

71. (New) A memory tangibly embodying a program of machine-readable instructions executable by a digital processing apparatus to perform operations, the operations comprising:

sending a notification to a mobile station, wherein the notification is configured to begin updating of a security-related parameter by the mobile station;

receiving a capability message from the mobile station, wherein the capability message is indicative of a messaging technique supported by the mobile station;

sending, based on the capability message, a first request message to the mobile station, wherein the first request message comprises at least one first command defined to cause the mobile station to invoke a process to update the security-related parameter;

receiving a first response message from the mobile station, wherein the first response message comprises a status of a computation of a first value performed by the mobile station;

sending a second request message to the mobile station, wherein the second request message comprises a second value and at least one second command defined to cause the mobile station to compute the security-related parameter;

receiving a second response message from the mobile station, wherein the second response message comprises the first value;

sending a first commit message to the mobile station; and

receiving a first commit response message from the mobile station,

wherein communications between the digital processing apparatus and the mobile station are performed using an internet protocol.

72. (New) The memory of claim 71, wherein the security-related parameter comprises an authentication key, a security key or a security key defined by a code-division multiple access standard.

73. (New) The memory of claim 71, wherein the internet protocol comprises an internet protocol-based over-the-air device management protocol.

74. (New) The memory of claim 71, wherein the digital processing apparatus comprises an internet protocol-based over-the-air device management server.

75. (New) The memory of claim 71, wherein the first value comprises a MS_RESULT value and wherein the second value comprises a BS_RESULT value.

76. (New) The memory of claim 71, wherein the at least one first command comprises a first EXEC command and wherein the at least one second command comprises a second EXEC command.

77. (New) The memory of claim 71, wherein the first request message comprises an internet protocol-based over-the-air device management key request message, wherein the first response message comprises an internet protocol-based over-the-air device management key response message, wherein the second request message comprises an internet protocol-based over-the-air device management key gen request message, wherein the second response message comprises an internet protocol-based over-the-air device management key gen response message, wherein the commit message comprises an internet protocol-based over-the-air device management commit message, wherein the commit response message comprises an internet protocol-based over-the-air device management commit response message.

78. (New) The memory of claim 71, wherein the notification is sent to the mobile station in response to receiving a third request message from another server, wherein the first request message encapsulates the third request message, the operations further comprising:

sending a third response message to the other server, wherein the third response message comprises the status of the computation of the first value;

receiving a fourth request message from the other server, wherein the fourth request message comprises the second value, wherein the second request message is sent to the mobile station in response to receiving the fourth request message, wherein the second request message encapsulates the fourth request message;

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sending, in response to receiving the second response message from the mobile station, a fourth response message to the other server, wherein the fourth response message comprises the first value;

receiving a second commit message from the other server, wherein the first commit message is sent in response to receiving the second commit message from the other server; and

sending, in response to receiving the first commit response message from the mobile station, a second commit response message to the other server.

79. (New) The memory of claim 78, wherein the other server comprises an IS-683 server, wherein the memory, in conjunction with the machine-readable program instructions, is configured to enable the IS-683 server to invoke the updating of the security-related parameter by the mobile station using internet protocol-based communications.

80. (New) The memory of claim 71, the operations further comprising:

in response to receiving the first response message from the mobile station, computing the second value; and

in response to receiving the second response message from the mobile station, computing the security-related parameter.

81. (New) A method comprising:

sending a notification from a server to a mobile station, wherein the notification is configured to begin updating of a security-related parameter by the mobile station;

sending a first request message from the server to the mobile station, wherein the first request message comprises at least one first command defined to cause the mobile station to invoke a process to update the security-related parameter;

sending a second request message from the server to the mobile station, wherein the second request message comprises a second value and at least one second command defined to cause the mobile station to compute the security-related parameter; and

sending a first commit message from the server to the mobile station,

wherein communications between the server and the mobile station are performed using an internet protocol.

82. (New) The method of claim 81, further comprising:

receiving, by the server, a capability message from the mobile station, wherein the capability message is indicative of a messaging technique supported by the mobile station;

receiving, by the server, a first response message from the mobile station, wherein the first response message comprises a status of a computation of a first value performed by the mobile station;

receiving, by the server, a second response message from the mobile station, wherein the second response message comprises the first value; and

receiving, by the server, a first commit response message from the mobile station,

wherein the security-related parameter comprises an authentication key, a security key or a security key defined by a code-division multiple access standard, wherein the internet protocol comprises an internet protocol-based over-the-air device management protocol, wherein the server comprises an internet protocol-based over-the-air device management server.

83. (New) The method of claim 82, wherein the first value comprises a MS_RESULT value and the second value comprises a BS_RESULT value, wherein the at least one first command comprises a first EXEC command and the at least one second command comprises a second EXEC command.

84. (New) The method of claim 82, wherein the first request message comprises an internet protocol-based over-the-air device management key request message, wherein the first response message comprises an internet protocol-based over-the-air device management key response message, wherein the second request message comprises an internet protocol-based over-the-air device management key gen request message, wherein the second response message comprises

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an internet protocol-based over-the-air device management key gen response message, wherein the commit message comprises an internet protocol-based over-the-air device management commit message, wherein the commit response message comprises an internet protocol-based over-the-air device management commit response message.

85. (New) The method of claim 82, wherein the notification is sent from the server to the mobile station in response to the server receiving a third request message from another server, wherein the first request message encapsulates the third request message, the method further comprising:

sending a third response message from the server to the other server, wherein the third response message comprises the status of the computation of the first value;

receiving, by the server, a fourth request message from the other server, wherein the fourth request message comprises the second value, wherein the second request message is sent from the server to the mobile station in response to the server receiving the fourth request message, wherein the second request message encapsulates the fourth request message;

sending, in response to the server receiving the second response message from the mobile station, a fourth response message from the server to the other server, wherein the fourth response message comprises the first value;

receiving, by the server, a second commit message from the other server, wherein the first commit message is sent in response to the server receiving the second commit message from the other server; and

sending, in response to the server receiving the first commit response message from the mobile station, a second commit response message from the server to the other server.

86. (New) The method of claim 82, further comprising:

in response to the server receiving the first response message from the mobile station, computing, by the server, the second value; and

in response to the server receiving the second response message from the mobile station, computing, by the server, the security-related parameter.

87. (New) An apparatus comprising:

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at least one processor; and

at least one memory including machine-readable program instructions, the at least one memory and the machine-readable program instructions being configured to, with the at least one processor, cause the apparatus at least to perform:

sending a notification to a mobile station, wherein the notification is configured to begin updating of a security-related parameter by the mobile station;

sending a first request message to the mobile station, wherein the first request message comprises at least one first command defined to cause the mobile station to invoke a process to update the security-related parameter;

sending a second request message to the mobile station, wherein the second request message comprises a second value and at least one second command defined to cause the mobile station to compute the security-related parameter; and

sending a first commit message to the mobile station,

wherein communications between the apparatus and the mobile station are performed using an internet protocol.

88. (New) The apparatus of claim 87, the at least one memory and the machine-readable program instructions being configured to, with the at least one processor, cause the apparatus at least to further perform:

receiving a capability message from the mobile station, wherein the capability message is indicative of a messaging technique supported by the mobile station;

receiving a first response message from the mobile station, wherein the first response message comprises a status of a computation of a first value performed by the mobile station;

receiving a second response message from the mobile station, wherein the second response message comprises the first value; and

receiving a first commit response message from the mobile station,

wherein the security-related parameter comprises an authentication key, a security key or a security key defined by a code-division multiple access standard, wherein the internet protocol comprises an internet protocol-based over-the-air device management

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protocol, wherein the apparatus comprises an internet protocol-based over-the-air device management server.

89. (New) The apparatus of claim 88, wherein the first value comprises a MS_RESULT value and the second value comprises a BS_RESULT value, wherein the at least one first command comprises a first EXEC command and the at least one second command comprises a second EXEC command.

90. (New) The apparatus of claim 88, wherein the first request message comprises an internet protocol-based over-the-air device management key request message, wherein the first response message comprises an internet protocol-based over-the-air device management key response message, wherein the second request message comprises an internet protocol-based over-the-air device management key gen request message, wherein the second response message comprises an internet protocol-based over-the-air device management key gen response message, wherein the commit message comprises an internet protocol-based over-the-air device management commit message, wherein the commit response message comprises an internet protocol-based over-the-air device management commit response message.

91. (New) The apparatus of claim 88, wherein the notification is sent to the mobile station in response to receiving a third request message from another server, wherein the first request message encapsulates the third request message, the at least one memory and the machine-readable program instructions being configured to, with the at least one processor, cause the apparatus at least to further perform:

sending a third response message to the other server, wherein the third response message comprises the status of the computation of the first value;

receiving a fourth request message from the other server, wherein the fourth request message comprises the second value, wherein the second request message is sent to the mobile station in response to the server receiving the fourth request message, wherein the second request message encapsulates the fourth request message;

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sending, in response to receiving the second response message from the mobile station, a fourth response message to the other server, wherein the fourth response message comprises the first value;

receiving a second commit message from the other server, wherein the first commit message is sent in response to receiving the second commit message from the other server; and

sending, in response to receiving the first commit response message from the mobile station, a second commit response message to the other server.

92. (New) The apparatus of claim 88, the at least one memory and the machine-readable program instructions being configured to, with the at least one processor, cause the apparatus at least to further perform:

in response to receiving the first response message from the mobile station, computing the second value; and

in response to receiving the second response message from the mobile station, computing the security-related parameter.

93. (New) A memory tangibly embodying a program of machine-readable instructions executable by a digital processing apparatus to perform operations, the operations comprising:

sending a notification to a mobile station, wherein the notification is configured to begin updating of a security-related parameter by the mobile station;

sending a first request message to the mobile station, wherein the first request message comprises at least one first command defined to cause the mobile station to invoke a process to update the security-related parameter;

sending a second request message to the mobile station, wherein the second request message comprises a second value and at least one second command defined to cause the mobile station to compute the security-related parameter; and

sending a first commit message to the mobile station,

wherein communications between the digital processing apparatus and the mobile station are performed using an internet protocol.

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94. (New) The memory of claim 93, the operations further comprising:

receiving a capability message from the mobile station, wherein the capability message is indicative of a messaging technique supported by the mobile station;

receiving a first response message from the mobile station, wherein the first response message comprises a status of a computation of a first value performed by the mobile station;

receiving a second response message from the mobile station, wherein the second response message comprises the first value; and

receiving a first commit response message from the mobile station,

wherein the security-related parameter comprises an authentication key, a security key or a security key defined by a code-division multiple access standard, wherein the internet protocol comprises an internet protocol-based over-the-air device management protocol, wherein the digital processing apparatus comprises an internet protocol-based over-the-air device management server.

95. (New) The memory of claim 94, wherein the first value comprises a MS_RESULT value and the second value comprises a BS_RESULT value, wherein the at least one first command comprises a first EXEC command and the at least one second command comprises a second EXEC command.

96. (New) The memory of claim 94, wherein the first request message comprises an internet protocol-based over-the-air device management key request message, wherein the first response message comprises an internet protocol-based over-the-air device management key response message, wherein the second request message comprises an internet protocol-based over-the-air device management key gen request message, wherein the second response message comprises an internet protocol-based over-the-air device management key gen response message, wherein the commit message comprises an internet protocol-based over-the-air device management commit message, wherein the commit response message comprises an internet protocol-based over-the-air device management commit response message.

97. (New) The memory of claim 94, wherein the notification is sent to the mobile station in response to receiving a third request message from another server, wherein the first request message encapsulates the third request message, the operations further comprising:

sending a third response message to the other server, wherein the third response message comprises the status of the computation of the first value;

receiving a fourth request message from the other server, wherein the fourth request message comprises the second value, wherein the second request message is sent to the mobile station in response to the server receiving the fourth request message, wherein the second request message encapsulates the fourth request message;

sending, in response to receiving the second response message from the mobile station, a fourth response message to the other server, wherein the fourth response message comprises the first value;

receiving a second commit message from the other server, wherein the first commit message is sent in response to receiving the second commit message from the other server; and

sending, in response to receiving the first commit response message from the mobile station, a second commit response message to the other server.

98. (New) The memory of claim 94, the operations further comprising:

in response to receiving the first response message from the mobile station, computing the second value; and

in response to receiving the second response message from the mobile station, computing the security-related parameter.

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